**REVENUE ACT OF 1921. 42 ST. L. 227. TITLE IX.**

Sec. 900. That from and after January 1, 1922, there shall be levied, assessed, collected, and paid upon the following articles sold or leased by the manufacturer, producer, or importer, a tax equivalent to the following percentage of the price for which so sold or leased:

(1) Automobile trucks and automobile wagons (including tires, inner tubes, parts, and accessories therefor, sold on or in connection therewith or with the sale thereof), 3 per centum;

(2) Other automobiles and motorcycles (including tires, inner tubes, parts, and accessories therefor, sold on or in connection therewith or with the sale thereof), except tractors, 5 per centum;

(3) Tires, inner tubes, parts, or accessories, for any of the articles enumerated in subdivision (1) or (2), sold to any person other than a manufacturer or producer of any of the articles enumerated in sub-division (1) or (2), 5 per centum.

Act passed November 23, 1921.
Effective November 23, 1921.

**REVENUE ACT OF 1924. 43 ST. L. 253. TITLE VI.**

Sec. 600. On and after the expiration of thirty days after the enactment of this act there shall be levied, assessed, collected, and paid upon the following articles sold or leased by the manufacturer,

producer, or importer, a tax equivalent to the following percentage of the price for which so sold or leased:

(1) Automobile truck chassis and automobile wagon chassis sold or leased for an amount in excess of $1,000. and automobile truck bodies and automobile wagon bodies sold or leased for an amount in excess of $200. (including in both cases tires, inner tubes, parts, and accessories therefor sold on or in connection therewith or with the sale thereof), 3 per centum. A sale or lease of an automobile truck or of an automobile wagon shall, for the purpose of this sub-division, be considered to be a sale of the chassis and of the body.

(2) Other automobile chassis and bodies and motorcycles (including tires, inner tubes, parts and accessories therefor sold on or in connection therewith or with the sale thereof) except tractors, 5 per centum. A sale or lease of an automobile shall, for the purpose of this sub-division, be considered to be a sale of the chassis and of the body.

(3) Tires, inner tubes, parts, or accessories for any of the articles enumerated in sub-division (1) or (2), sold to any person other than a manufacturer or producer of any of the articles enumerated in sub-division (1) or (2), 2½ per centum. This sub-division shall not apply to chassis or bodies for automobile trucks, automobile wagons or other automobiles.

Act passed June 2, 1924.
Act effective July 3, 1924.

## SECTION 424, REVENUE ACT OF 1928.

(*a*) No refund shall be made of any amount paid by or collected from any manufacturer, producer, or importer in respect of the tax imposed by subdivision (3) of section 600 of the Revenue Act of 1924, or subdivision (3) of section 900 of the Revenue Act of 1921 or of the Revenue Act of 1918, unless either—

(1) Pursuant to a judgment of a court in an action duly begun prior to April 30, 1928; or

(2) It is established to the satisfaction of the Commissioner that such amount was in excess of the amount properly payable upon the sale or lease of an article subject to tax, or that such amount was not collected, directly or indirectly, from the purchaser or lessee, or that such amount, although collected from the purchaser or lessee, was returned to him; or

(3) The Commissioner certifies to the proper disbursing officer that such manufacturer, producer, or importer has filed with the Commissioner, under regulations prescribed by the Commissioner with the approval of the Secretary, a bond in such sum and with such sureties as the Commissioner deems necessary, conditioned upon the immediate repayment to the United States of such portion of the amount refunded as is not distributed by such manufacturer, producer, or importer within six months after the date of the payment of the refund, to the persons who purchased for purposes of consumption (whether from such manufacturer, producer, importer, or from any other person) the articles in respect of which the

refund is made, as evidenced by the affidavits (in such form and containing such statements as the Commissioner may prescribe) of such purchasers, and that such bond, in the case of a claim allowed after February 28, 1927, was filed before the allowance of the claim by the Commissioner.

(*b*) The second proviso under the heading "Internal Revenue" in section 1 of the First Deficiency Act, fiscal year 1928, and the second proviso of the fourth paragraph under the heading "Internal Revenue Service" in section 1 of the Treasury and Post Office Appropriation Act for the fiscal year 1929, are repealed.

Act passed May 29, 1928.

**SECTION 989 REVISED STATUTES, Act of 3 March, 1863 CH. 16; 12 Stat. L. 741.**

When a recovery is had in any suit or proceeding against a collector or other officer of the revenue for any act done by him, or for the recovery of any money exacted by or paid to him and by him paid into the Treasury, in the performance of his official duty, and the court certifies that there was probable cause for the act done by the collector or other officer, or that he acted under the directions of the Secretary of the Treasury, or other proper officer of the Government, no execution shall issue against such collector or other officer, but the amount so recovered shall, upon final judgment, be provided for and paid out of the proper appropriation from the Treasury.

## SECTION 3226 R. S. AS AMENDED BY SECTION 1113 REVENUE ACT, 1926.

No suit or proceeding shall be maintained in any court for the recovery of any internal-revenue tax alleged to have been erroneously or illegally assessed or collected, or of any penalty claimed to have been collected without authority, or of any sum alleged to have been excessive or in any manner wrongfully collected until a claim for refund or credit has been duly filed with the Commissioner of Internal Revenue, according to the provisions of law in that regard, and the regulations of the Secretary of the Treasury established in pursuance thereof; but such suit or proceeding may be maintained, whether or not such tax, penalty, or sum has been paid under protest or duress. No such suit or proceeding shall be begun before the expiration of six months from the date of filing such claim unless the Commissioner renders a decision thereon within that time, nor after the expiration of five years from the date of the payment of such tax, penalty, or sum, unless such suit or proceeding is begun within two years after the disallowance of the part of such claim to which such suit or proceeding relates. The Commissioner shall within 90 days after any such disallowance notify the taxpayer thereof by mail.

(*b*) This section shall not affect any proceeding in court instituted prior to the enactment of the Revenue Act of 1924.

## TREASURY REGULATIONS 47, Promulgated May 1, 1919, under Section 900 of the Revenue Act of 1918.

ART. 15. Definition of parts. A "part" for an automobile truck, automobile wagon, other automobile, or motorcycle is any article designed or manufactured for the special purpose of being used as or to replace a component part of any such vehicle, and which by reason of some peculiar characteristic is not such a commercial commodity as would ordinarily be sold for general use, and which is primarily adaptable only for use as a component part of such vehicle. Mere stock or commercial commodities such as bolts, nuts, washers, screws, though used as components for such vehicles, are not "parts" within the meaning of subsection (3) of section 900. Articles, however, which ordinarily would be classed as commercial commodities become parts when, because of their design or construction, they are primarily adaptable for use as component parts of such vehicles. Component parts of articles taxable under this definition are taxable when sold separately, if they have reached such stage of manufacture that they are primarily adaptable for use as such a component part. Thus plates, jars, and separators for automobile storage batteries are taxable when sold separately. A chassis is a part of an automobile and taxable at the rate of 5 per cent. when sold separately regardless of whether it is a chassis for an automobile truck or wagon, or for any other kind of automobile. An automobile body is also a part of an automobile.

**TREASURY REGULATIONS 47, Revised December 27, 1920.**

ART. 15. Definition of parts. A "part" for an automobile truck, automobile wagon, other automobile, or motor cycle is any article designed or manufactured for the special purpose of being used as or to replace a component part of any such vehicle and which by reason of some peculiar characteristic is not such a commercial commodity as would ordinarily be sold for general use and which is primarily adapted only for use as a component part of such vehicle.

The term includes bodies, wheels, engines, springs, axles, radiators, etc. When sold separately a side car and a so-called trailer or "semitrailer" so designed that a portion of the load or the weight thereof is carried or borne by the tractor or "semitractor" are taxable as "parts."

Mere stock or commercial commodities, such as bolts, nuts, washers, screws, etc. though used as components for such vehicles, are not "parts" within the meaning of subdivision (3). Articles, however, which ordinarily would be classed as commercial commodities become parts when, because of their design or construction, they are primarily adapted for use as component parts of such vehicles.

Component parts of articles taxable under this definition are taxable when sold separately if they have reached such stage of manufacture that they are primarily adapted for use as a component part. Thus plates, jars and separators for automobile

storage batteries are taxable when sold separately. Blow-out shoes and reliners of tires are subject to tax as "parts" regardless of the fact that they may be made from old casings.

**TREASURY REGULATIONS 47, revised January 6, 1922.**

ART. 15. *Definition of parts.* A "part" for an automobile truck, automobile wagon, other automobile, or motor cycle is any article designed or manufactured for the special purpose of being used as or to replace a component part of any such vehicle and which by reason of some peculiar characteristic is not such a commercial commodity as would ordinarily be sold for general use and which is primarily adapted only for use as a component part of such vehicle.

The term includes bodies, wheels, engines, springs, axles, radiators etc. When sold separately a side car and a so-called trailer or "semitrailer" so designed that a portion of the load or the weight thereof is carried or borne by the tractor or "semitractor" are taxable as "parts."

Mere stock or commercial commodities, such as bolts, nuts, washers, screws, etc., though used as components for such vehicles, are not "parts" within the meaning of subdivision (3). Articles, however, which ordinarily would be classed as commercial commodities become parts when, because of their design or construction, they are primarily adapted for use as component parts of such vehicles.

Component parts of articles taxable under this definition are taxable when sold separately if they have reached such stage of manufacture that they are primarily adapted for use as a component part. Blow-out shoes are subject to tax as "parts" regardless of the fact that they may be made from old castings.

**TREASURY REGULATIONS 47, Revised August 1924.**

ART. 16. A "part" for an automobile truck, automobile wagon, or other automobile chassis or body, or motorcycle, is any article designed or manufactured for the special purpose of being used as, or to improve, repair or replace a component part of any such vehicle, or article, and which by reason of some peculiar characteristic is not such a commercial commodity as would ordinarily be sold for general use, or which is primarily adapted only for use as a component part of such vehicle or article.

An "accessory" for an automobile truck, automobile wagon, or other automobile chassis or body, or motorcycle, is an article designed to be attached to or used in connection with such vehicle or article to add to its utility or ornamentation, or any article which is primarily adapted for use in connection with such vehicle or article whether or not essential to its operation or use.

## ARTICLE 1255, REGULATIONS OF TREASURY, NUMBER 74 (1928) 322 CCH. 1669.

Claims for refund in case of judgment obtained against collector. (a) Claims for the amount of a judgment against a collector of internal revenue for the recovery of taxes, penalties, or other sums should be made on Form 843 and filed with the Commissioner of Internal Revenue, Washington, D. C. The claimant should state the grounds of his claim under oath, giving the names of all the parties to the suit, the cause of action, the date of its commencement, the date of the judgment, the court in which it was recovered, and its amount. To this affidavit there should be annexed a certified copy of the final judgment in duplicate, a certificate of probable cause, and an itemized bill of the costs paid, receipted by the clerk or other proper officer of the court.

## OPINION OF THE DISTRICT COURT BELOW ON SEC. 424, REVENUE ACT OF 1928.

IN THE DISTRICT COURT OF THE UNITED STATES FOR THE NORTHERN DISTRICT OF OHIO, EASTERN DIVISION.

| | | |
|---|---|---|
| *Willard Storage Battery Company, Plaintiff.* v. *C. F. Routzahn, Collector of Internal Revenue, 18th District of Ohio, Defendant.* | AT LAW | 15761<br>15762<br>15763<br>15764<br>15765 |

OPINION HANDED DOWN DECEMBER 16, 1929, UPON MOTION TO DISMISS.

WEST, *District Judge:*

Until these matters were argued, I was unaware that the question raised by the motions had been previously considered and passed upon by Judge Jones in Sterling Spring Co. *v.* Routzahn, Collector, No. 15574. In conference with him, he expressed the opinion that his memorandum should not be regarded as the law of the district on the question presented in these motions, especially since no review of that case was taken.

Plaintiff sues the collector for the recovery of the manufacturer's excise taxes paid on electric storage batteries and erroneously imposed, as it is claimed, under Secs. 900 (3) of the Revenue Act of 1921, and 600 (3) of the Revenue Act of 1924. The taxes are alleged to have been illegal, because

the batteries sold by plaintiff did not constitute parts or accessories for any of the articles enumerated in subdivision (1) or (2), Sec. 900, Revenue Act of 1921, or in subdivisions (1) or (2), Sec. 600, Revenue Act of 1924, and neither the batteries nor the sales thereof by plaintiff were subject to be taxed. Defendant moves to dismiss on the ground that Sec. 424, Revenue Act of 1928 (Sec. 2424, Tit. 26, U. S. C.) deprives plaintiff of its privilege of refund and of maintaining an action begun subsequent to May 29, 1928; for lack of jurisdiction in the court to review the discretionary power vested in the Commissioner by the provisions of said Sec. 424, and because that section provides an exclusive remedy. Said section reads as follows:

> "No refund shall be made of any amount paid or collected from any manufacturer, producer, or importer in respect of the tax imposed by subdivision (3) of Section 600 of the Revenue Act of 1924, or subdivision (3) of section 900 of the Revenue Act of 1921 or of the Revenue Act of 1918, unless either
>
> (1) Pursuant to a judgment of a court in an action duly begun prior to April 30, 1928; or
>
> (2) It is established to the satisfaction of the Commissioner that such amount was in excess of the amount properly payable upon the sale or lease of an article subject to tax, or that such amount was not collected, directly or indirectly, from the purchaser or lessee, or that such amount, although collected from the purchaser or lessee, was returned to him; or

(3) The Commissioner certifies to the proper disbursing officer that such manufacturer, producer, or importer has filed with the Commissioner, under regulations prescribed by the Commissioner with the approval of the Secretary, a bond in such sum and with such sureties as the Commissioner deems necessary, conditioned upon the immediate repayment to the United States of such portion of the amount refunded as is not distributed by such manufacturer, producer, or importer, within six months after the date of the payment of the refund, to the persons who purchased for purposes of consumption (whether from such manufacturer, producer, importer, or from any other person) the articles in respect of which the refund is made, as evidenced by the affidavits (in such form and containing such statements as the Commissioner may prescribe) of such purchasers, and that such bond, in the case of a claim allowed after February 28, 1927, was filed before the allowance of the claim by the Commissioner."

Since its enactment, the excise taxes mentioned in the first clause, however illegal or erroneous, can be refunded only in accordance with its provisions.

It is the defendant's contention that a discretionary power is committed to the Commissioner with respect to all the said illegal exactions, except such as are covered by the judgment of a court mentioned in sub (1); and that, in the exercise thereof, the Commissioner alone must determine whether or not the taxes were lawful, the courts being deprived of all jurisdiction in the premises.

I can not agree with this view, and in my opinion, the language of the statute leads directly to another result. Under sub (2) claims for excessive taxes collected upon sales or leases which were properly subject to a lesser tax, and claims for illegal taxes which either were not collected by the taxpayer from the purchaser or lessee, or if collected, have been returned to him, are dealt with by the Commissioner. But whether his power with respect to such claims or any of them is final, and what if any jurisdiction the courts may have as to such claims, seems to me beside the precise question involved. For, under the averments of the plaintiff's petitions, the claims sued on are of an entirely different character. The taxes were not assessed in an excessive amount upon sales which were taxable, and there is no intimation, either in the petitions or motions that they were not collected from, or were returned to the purchasers of the articles. The distinction between taxes which are excessive in amount and those which are entirely illegal, was clearly in the mind of Congress. This is shown by the Report No. 2 of the Committee on Ways and Means of the House, of December 7, 1927, wherein, at p. 27, after stating that the committee did not believe that, as a general principle, taxes paid upon articles subsequently held to be not taxable should be refunded and thus unjustly enrich the manufacturers, who merely collect the tax from the persons to whom they sold the articles, it is said:

"However there are some cases where refunds should properly be made. Accordingly section 424 of the new bill provides that judgments of the court should be paid if the action was begun prior to the effective date of the Deficiency Act. It also provides that refunds may be made whenever the taxpayer can establish to the satisfaction of the Commissioner that the amounts he paid was excessive (not by reason of the fact that the article was wrongly taxed, but by reason of the fact that the tax was improperly computed)."

The language of the section naming as one condition upon which refunds may be made that "it is established to the satisfaction of the Commissioner that such amount was in excess of the amount properly payable upon the sale or lease of an article subject to tax," embodies the view of the Committee. It further appears by Conference Report No. 1362, May 25, 1928, that the original bill passed by the House, prohibited refunds except upon conditions, one being: "or (2) unless the amount was an ordinary over payment of the amount due upon the sale of an article actually subject to the tax."

A tax wholly unauthorized, is not within sub (2), unless it has been passed on to the purchaser or lessee; but falls within subdivision (3) of section 424, and is to be refunded upon the giving of bond conditioned that within six months it will be repaid to the United States, unless in the meantime distributed to the consumers.

The report of the Ways and Means Committee

above mentioned, closes with the statement that "in all other cases" [other than those covered by (1) and (2)] the taxpayer "must comply with conditions similar to those imposed by the proviso in the deficiency act and give a bond conditioned upon the refund of the tax to the ultimate consumer."

It is quite clear from this report that the Committee which announced that as a general principle, taxes paid upon articles subsequently held not taxable ought not to be refunded so as to unjustly enrich the manufacturer, did not regard the temporary refund under sub (3) of the section as being contrary to this principle, evidently because it is not for the benefit of the manufacturer, but solely for that of the consumer.

The court therefore concludes that as to claims such as those of the plaintiff, there has been no effort by Congress to give the Commissioner final power to determine their legality. When presented, he may reject such a claim because he believes that the taxes imposed were not illegal, or for any other sufficient reason, but his action is not final; and the question of legality then becomes one for the courts to determine. Power finally to decide upon the legality of the exaction must reside somewhere, and where the entire amount of such excise taxes is involved, it rests, since the enactment of section 424, just where it did before—that is, in the courts.

Williamsport Wire Rope Co. v. U. S., 277 U. S. 551, is relied upon by the defendant. It was there

held that the power of the Commissioner in determining whether a corporation is entitled under Sections 327 (a) and (b) of the Revenue Act of 1919 to have its war and excess profits taxes fixed by a special assessment under Section 326, by a comparison with the taxes of other representative corporations engaged in like business, is discretionary and not subject to review by the courts. But the language of these sections, as well as the many reasons advanced by the Supreme Court why such a construction was necessary to the consistent administration of the law, sufficiently distinguishes that case from these. Whether or not plaintiff's batteries were accessories within the meaning of the revenue acts, is a question to the determination of which the courts are entirely competent. In the view of the court, there is nothing in the language employed in section 424 which confers discretionary power upon the Commissioner to finally decide upon the legality or illegality of the taxes imposed upon the plaintiff, nor is any reason apparent why such final jurisdiction should have been conferred.

The question now before the court is the plaintiff's right to bring and maintain these actions. They are against the Collector and seek personal judgments only. Whether or not they finally result in collectible claims against him or the United States, the court is bound to entertain them, unless prevented by section 424. It can not now be known with certainty that any judgments recovered will be paid by the United States. Smietanka *v.* U. S., 257 U. S. 1, 4.

If no certificate of probable cause issues by the court and the United States does not become liable, nothing in section 424 relating to refunds from the U. S. Treasury can possibly affect the controversy between the plaintiff and the defendant as it will then stand. That section, whatever power it may confer upon the Commissioner, and take from the courts with respect to the determination of facts as the basis of refunds, would not seem to affect the jurisdiction to maintain an action against a collector for recovery of any excise taxes, even though of a class covered by its provisions.

But if it were now certain that a certificate would issue, the court is of opinion that the section does not cut down the court's jurisdiction, with respect to the particular claims involved in these cases.

If illegality of these taxes is established by judgments, refunds will not be made "pursuant to" such judgments, within the meaning of Sec. 424, sub (1); but pursuant to sub (3), and will be conditional and for the benefit of consumers.

If the petitions may be entertained, it is no objection that they were filed subsequently to April 30 or May 29, 1928.

The motions will be overruled.

S. H. WEST,
*Judge.*

## SPARK PLUG DECISION.

**Cumulative Bulletin II-2, p. 308-Jul.-Dec. 1923 11-22-1076: S. T. 426.**

It is a well known fact that spark plugs were in use for many years before automobiles came into existence. It is also common knowledge that they are used on all kinds of internal combustion engines, both stationary and portable. It is stated that all the drawings and illustrations in the files of the Patent Office show the use of spark plugs in stationary engines. Spark plugs are made in a few standard sizes, and all engines in which they are to be used are designed for the standard size plugs. There is no question but that the same spark plugs are interchangeable in both stationary and portable engines. While they are used very extensively in automobiles, the same plugs are used in motor boats, airplanes, farm tractors, road graders, railway locomotive engines, threshing machines, concrete mixers, water pumps, hoisting machines, and for innumerable other purposes.

In S. T. 380 (C. B. I-1, p. 444) it was held that piston rings not designed or manufactured with some peculiar characteristic which made them primarily adaptable only on or in connection with automobiles are not taxable. In S. T. 395 (C. B. I-2, p. 295) it was held that leaf-springs, other than highly specialized leaf-springs such as auxilliary shock-absorbing devices using the leaf-spring principle, which are not primarily adapted only for use as a

component part of an automobile or motorcycle, are not taxable. In S. T. 408 (C. B. II 1, p. 285) it was held that miniature incandescent electric light bulbs for use in automobile lamps are commercial commodities and not subject to tax. These rulings were made on the principle that under the definition contained in the regulations it is clear that an article which is sold for general use other than in connection with automobiles and which has no peculiar characteristic in its design or manufacture which adapts it primarily only for use in connection with automobile trucks, automobile wagons, other automobiles, or motor cycles, is not subject to tax as a part, although sold for use in or upon any such vehicle.

Applying the principle in the above cases to spark plugs, where it is clearly shown that the articles in question are not specially designed nor primarily adaptable only for use on or in connection with automobiles but are interchangeable and extensively used in many other industries, it is the opinion of this office that spark plugs should be held to be commercial commodities and not subject to the excise tax imposed by sections 900 (3) of the Revenue Acts of 1918 and 1921.

## LIST OF SOME USES OF RESPONDENT'S BATTERIES.

The record of testimony shows that Willard Storage Batteries of the types applicable to automobiles

and upon which the excise taxes in suit were paid, were used during the period from 1922 until 1926 for the following purposes:

| Use | Witness | Record |
|---|---|---|
| **Airplanes** (Used to light landing lights, navigation lights, and instrument lights and to operate electric starter.) | R. S. Van Cleve | Pages 71, 72 |
| **Army tanks** | E. M. Sutherland | Page 57 |
| **Bell ringing** | L. W. Leonard | Page 78 |
| **Bilge Pumps on ships** | A. E. Harrold | Page 55 |
| **Cabs of Railway cars** | E. M. Sutherland | Page 56 |
| **Calliopes** | A. E. Harrold | Page 53 |
| **Camp Kitchen utensils** | A. E. Harrold | Page 54 |
| **Christmas Tree lighting** | E. M. Sutherland | Page 56 |
| **Circuit Breaker Operation** | A. E. Harrold | Page 54 |
| **Compass on ships** | A. E. Harrold | Page 55 |
| **Concrete mixing machines** | C. T. Klug | Page 52 |
| **Cranes** | L. W. Leonard | Page 78 |
| **Custer cars (amusement parks)** | H. C. Negus | Page 63 |
| **Dental drills** | A. E. Harrold | Page 54 |
| **Depth Sounding Equipment** | R. S. Van Cleve | Page 71 |
| **Diesel Engine ignition** | A. E. Harrold | Page 54 |
| **Ditch digger** | C. T. Klug | Page 52 |
| **Door Bells** | C. T. Klug | Page 52 |
| **Drawbridges** | A. E. Harrold | Page 55 |
| **Drilling Engines** | M. J. Brennan | Page 59 |
| **Electric Clocks** | L. J. Lechner | Page 76 |
| | C. C. Schellentrager | Page 77 |
| **Electric Hoists** | A. E. Harrold | Page 55 |
| **Emergency engines** | A. E. Harrold | Page 53 |
| **Emergency lights** | W. E. Bender | Page 68 |
| **Emergency lighting on Steamships** | A. E. Harrold | Page 54 |
| **Experimental Work in laboratories** | L. J. Lechner | Page 76 |
| **Excavators** | C. T. Klug | Page 51 |
| **Fans** | A. E. Harrold | Page 54 |
| **Fire alarm systems** | A. E. Harrold | Page 54 |
| **Fog Horns** | A. E. Harrold | Page 54 |
| **Gas engine ignition** | A. E. Harrold | Page 54 |
| **Gasoline cranes** | C. T. Klug | Page 51 |
| **Gasoline shovels** | C. T. Klug | Page 51 |
| **Gun Firing in Navy** | R. S. Van Cleve | Page 71 |
| **Harvesting machinery** | C. T. Klug | Page 51 |
| **Heating Apparatus on Boats** | A. E. Harrold | Page 54 |
| **Heat Regulating Devices** | A. E. Harrold | Page 54 |
| **Hospital Lights** | L. J. Lechner | Page 76 |

| Use | Witness | Record |
|---|---|---|
| Hot Coil ignition (Diesel engine) | E. M. Sutherland | Page 56 |
| Hydraulic pumps | H. C. Negus | Page 63 |
| Incandescent lamp testing | A. E. Harrold | Page 53 |
| Industrial trucks | A. E. Harrold | Page 54 |
| Intercommunicating telephone systems | W. E. Bender | Page 68 |
| | C. C. Schellentrager | Page 77 |
| Isolated lighting systems | A. E. Harrold | Page 54 |
| | C. T. Klug | Page 52 |
| | A. E. Harrold | Page 54 |
| | M. J. Brennan | Pages 59, 60, 61 |
| | R. S. Van Cleve | Page 74 |
| | L. J. Lechner | Page 76 |
| | C. C. Schellentrager | Page 77 |
| | W. W. Parsons | Page 79 |
| Kitchen cooking (galley apparatus) | A. E. Harrold | Page 54 |
| Laboratory machinery | L. W. Leonard | Page 78 |
| Laboratory testing | C. T. Klug | Page 52 |
| | E. M. Sutherland | Page 56 |
| | L. S. Lechner | Page 76 |
| Logging machines | H. C. Negus | Page 63 |
| Manhole lighting | E. M. Sutherland | Page 56 |
| Marine engines | C. T. Klug | Page 51 |
| | M. J. Brennan | Pages 59, 60, 61 |
| Microferometers | A. E. Harrold | Page 53 |
| Micrometer Calipers | A. E. Harrold | Page 53 |
| Mine Locomotives | A. E. Harrold | Page 54 |
| Motor Boats | H. C. Negus | Page 63 |
| | R. S. Van Cleve | Page 71 |
| | L. W. Leonard | Page 78 |
| | W. W. Parsons | Page 79 |
| | C. E. Haas | Page 80 |
| Moving Picture Machines | A. E. Harrold | Pages 54, 55 |
| | L. J. Lechner | Page 76 |
| Oil Circuit Breakers (switch) | A. E. Harrold | Pages 53, 54 |
| | W. E. Bender | Page 68 |
| | C. C. Schellentrager | Page 77 |
| Oil motor pre-ignition | L. W. Leonard | Page 78 |
| Pneumatic tools (compressors etc.) | E. M. Sutherland | Pages 57, 58 |
| Police Alarm Systems | | |
| Portable lights (for fires, etc.) | H. C. Negus | Page 63 |
| Portable Public Address Systems | H. C. Negus | Page 63 |
| Potentiometers | A. E. Harrold | Page 53 |
| Power Carrier Telephones | H. C. Negus | Page 63 |
| Pyrometers | A. E. Harrold | Page 54 |

| Use | Witness | Record |
|---|---|---|
| Radio (receiving) | C. T. Klug | Page 52 |
| | A. E. Harrold | Page 54 |
| | E. M. Sutherland | Page 57 |
| | H. C. Negus | Pages 63, 64 |
| | Frank Denzel | Pages 66, 67 |
| | W. E. Bender | Page 68 |
| | R. S. Van Cleve | Pages 70, 71 |
| | L. G. Baldwin | Pages 73, 74 |
| | L. J. Lechner | Page 76 |
| | C. C. Schellentrager | Page 77 |
| | L. W. Leonard | Page 78 |
| | W. W. Parsons | Page 80 |
| | C. E. Hans | Page 80 |
| Radio broadcasting, filament, remote control, amplifiers, etc. | A. E. Harrold | Page 54 |
| | H. C. Negus | Page 63 |
| | R. S. Van Cleve | Pages 70, 71 |
| | L. G. Baldwin | Pages 73, 74, 75 |
| Railroad signals | A. E. Harrold | Page 54 |
| Railway speedsters | E. M. Sutherland | Page 56 |
| Road building machinery | C. T. Klug | Pages 51, 52, 53 |
| | M. J. Brennan | Page 59 |
| | W. W. Parsons | Pages 79, 80 |
| Road roller | C. T. Klug | Page 51 |
| Rudder indicator on ships | A. E. Harrold | Page 54 |
| Semi-Diesel engine ignition | A. E. Harrold | Page 54 |
| Signals in schools | W. W. Parsons | Page 79 |
| Snow machinery | M. J. Brennan | Page 58 |
| Stationary engines | C. T. Klug | Page 51 |
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